

Release notes for ENDF/B Development n-056_Ba_132
evaluation

ENDF
B-VII.dev

April 26, 2017

- checkr Warnings:

1. A previous error halted parsing of the current section
MAT=5631, MF= 1, MT=451 (1): Parsing stopped

```
ERROR(S) FOUND IN MAT=5631, MF= 1, MT=451
SECTION CANNOT BE CHECKED FROM SEQUENCE NUMBER      246 TO      293
```

- checkr Errors:

1. A variable is outside the allowed ENDF range
MAT=5631, MF= 1, MT=451 (0): Variable range

```
ERROR(S) FOUND IN MAT=5631, MF= 1, MT=451
MOD =      1 OUT OF RANGE      0 -      0      RECORD NUMBER      246
```

2. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 2, MT=151 (0): Directory (b)

```
ERROR(S) FOUND IN MAT=5631, MF= 2, MT=151
SECTION 2/151 NOT IN DIRECTORY      RECORD NUMBER      295
```

3. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 1 (0): Directory (b)

```
ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 1
SECTION 3/ 1 NOT IN DIRECTORY      RECORD NUMBER      450
```

4. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 2 (0): Directory (b)

```
ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 2
SECTION 3/ 2 NOT IN DIRECTORY      RECORD NUMBER      475
```

5. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 4 (0): Directory (b)

```
ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 4
SECTION 3/ 4 NOT IN DIRECTORY      RECORD NUMBER      500
```

6. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 16 (0): Directory (b)

```
ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 16
SECTION 3/ 16 NOT IN DIRECTORY      RECORD NUMBER      516
```

7. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 17 (0): Directory (b)

ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 17
SECTION 3/ 17 NOT IN DIRECTORY RECORD NUMBER 526

8. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 22 (0): Directory (b)

ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 22
SECTION 3/ 22 NOT IN DIRECTORY RECORD NUMBER 532

9. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 28 (0): Directory (b)

ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 28
SECTION 3/ 28 NOT IN DIRECTORY RECORD NUMBER 546

10. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 51 (0): Directory (b)

ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 51
SECTION 3/ 51 NOT IN DIRECTORY RECORD NUMBER 557

11. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 52 (0): Directory (b)

ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 52
SECTION 3/ 52 NOT IN DIRECTORY RECORD NUMBER 573

12. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 53 (0): Directory (b)

ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 53
SECTION 3/ 53 NOT IN DIRECTORY RECORD NUMBER 587

13. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 54 (0): Directory (b)

ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 54
SECTION 3/ 54 NOT IN DIRECTORY RECORD NUMBER 600

14. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 55 (0): Directory (b)

ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 55
SECTION 3/ 55 NOT IN DIRECTORY RECORD NUMBER 612

15. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 56 (0): Directory (b)

- | | | |
|---|---------------|-----|
| ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 56 | RECORD NUMBER | 624 |
| SECTION 3/ 56 NOT IN DIRECTORY | | |
16. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 57 (0): Directory (b)
- | | | |
|---|---------------|-----|
| ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 57 | RECORD NUMBER | 636 |
| SECTION 3/ 57 NOT IN DIRECTORY | | |
17. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 58 (0): Directory (b)
- | | | |
|---|---------------|-----|
| ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 58 | RECORD NUMBER | 647 |
| SECTION 3/ 58 NOT IN DIRECTORY | | |
18. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 59 (0): Directory (b)
- | | | |
|---|---------------|-----|
| ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 59 | RECORD NUMBER | 658 |
| SECTION 3/ 59 NOT IN DIRECTORY | | |
19. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 60 (0): Directory (b)
- | | | |
|---|---------------|-----|
| ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 60 | RECORD NUMBER | 668 |
| SECTION 3/ 60 NOT IN DIRECTORY | | |
20. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT= 91 (0): Directory (b)
- | | | |
|---|---------------|-----|
| ERROR(S) FOUND IN MAT=5631, MF= 3, MT= 91 | RECORD NUMBER | 678 |
| SECTION 3/ 91 NOT IN DIRECTORY | | |
21. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT=102 (0): Directory (b)
- | | | |
|---|---------------|-----|
| ERROR(S) FOUND IN MAT=5631, MF= 3, MT=102 | RECORD NUMBER | 687 |
| SECTION 3/102 NOT IN DIRECTORY | | |
22. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT=103 (0): Directory (b)
- | | | |
|---|---------------|-----|
| ERROR(S) FOUND IN MAT=5631, MF= 3, MT=103 | RECORD NUMBER | 706 |
| SECTION 3/103 NOT IN DIRECTORY | | |
23. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT=104 (0): Directory (b)

- | | | | |
|--|---|---------------|-----|
| | ERROR(S) FOUND IN MAT=5631, MF= 3, MT=104 | | |
| | SECTION 3/104 NOT IN DIRECTORY | RECORD NUMBER | 721 |
24. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT=105 (0): Directory (b)
- | | | | |
|--|---|---------------|-----|
| | ERROR(S) FOUND IN MAT=5631, MF= 3, MT=105 | | |
| | SECTION 3/105 NOT IN DIRECTORY | RECORD NUMBER | 734 |
25. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT=106 (0): Directory (b)
- | | | | |
|--|---|---------------|-----|
| | ERROR(S) FOUND IN MAT=5631, MF= 3, MT=106 | | |
| | SECTION 3/106 NOT IN DIRECTORY | RECORD NUMBER | 744 |
26. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 3, MT=107 (0): Directory (b)
- | | | | |
|--|---|---------------|-----|
| | ERROR(S) FOUND IN MAT=5631, MF= 3, MT=107 | | |
| | SECTION 3/107 NOT IN DIRECTORY | RECORD NUMBER | 756 |
27. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 4, MT= 2 (0): Directory (b)
- | | | | |
|--|--|---------------|-----|
| | ERROR(S) FOUND IN MAT=5631, MF= 4, MT= 2 | | |
| | SECTION 4/ 2 NOT IN DIRECTORY | RECORD NUMBER | 773 |
28. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 4, MT= 16 (0): Directory (b)
- | | | | |
|--|---|---------------|-----|
| | ERROR(S) FOUND IN MAT=5631, MF= 4, MT= 16 | | |
| | SECTION 4/ 16 NOT IN DIRECTORY | RECORD NUMBER | 950 |
29. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 4, MT= 17 (0): Directory (b)
- | | | | |
|--|---|---------------|-----|
| | ERROR(S) FOUND IN MAT=5631, MF= 4, MT= 17 | | |
| | SECTION 4/ 17 NOT IN DIRECTORY | RECORD NUMBER | 961 |
30. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 4, MT= 22 (0): Directory (b)
- | | | | |
|--|---|---------------|-----|
| | ERROR(S) FOUND IN MAT=5631, MF= 4, MT= 22 | | |
| | SECTION 4/ 22 NOT IN DIRECTORY | RECORD NUMBER | 972 |
31. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 4, MT= 28 (0): Directory (b)

- | | | |
|--|---|-------------------|
| | ERROR(S) FOUND IN MAT=5631, MF= 4, MT= 28 | |
| | SECTION 4/ 28 NOT IN DIRECTORY | RECORD NUMBER 983 |
32. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 4, MT= 51 (0): Directory (b)
- | | | |
|--|---|-------------------|
| | ERROR(S) FOUND IN MAT=5631, MF= 4, MT= 51 | |
| | SECTION 4/ 51 NOT IN DIRECTORY | RECORD NUMBER 994 |
33. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 4, MT= 52 (0): Directory (b)
- | | | |
|--|---|--------------------|
| | ERROR(S) FOUND IN MAT=5631, MF= 4, MT= 52 | |
| | SECTION 4/ 52 NOT IN DIRECTORY | RECORD NUMBER 1116 |
34. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 4, MT= 53 (0): Directory (b)
- | | | |
|--|---|--------------------|
| | ERROR(S) FOUND IN MAT=5631, MF= 4, MT= 53 | |
| | SECTION 4/ 53 NOT IN DIRECTORY | RECORD NUMBER 1141 |
35. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 4, MT= 54 (0): Directory (b)
- | | | |
|--|---|--------------------|
| | ERROR(S) FOUND IN MAT=5631, MF= 4, MT= 54 | |
| | SECTION 4/ 54 NOT IN DIRECTORY | RECORD NUMBER 1166 |
36. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 4, MT= 55 (0): Directory (b)
- | | | |
|--|---|--------------------|
| | ERROR(S) FOUND IN MAT=5631, MF= 4, MT= 55 | |
| | SECTION 4/ 55 NOT IN DIRECTORY | RECORD NUMBER 1191 |
37. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 4, MT= 56 (0): Directory (b)
- | | | |
|--|---|--------------------|
| | ERROR(S) FOUND IN MAT=5631, MF= 4, MT= 56 | |
| | SECTION 4/ 56 NOT IN DIRECTORY | RECORD NUMBER 1216 |
38. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 4, MT= 57 (0): Directory (b)
- | | | |
|--|---|--------------------|
| | ERROR(S) FOUND IN MAT=5631, MF= 4, MT= 57 | |
| | SECTION 4/ 57 NOT IN DIRECTORY | RECORD NUMBER 1241 |
39. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 4, MT= 58 (0): Directory (b)

- | | | |
|---|---------------|------|
| ERROR(S) FOUND IN MAT=5631, MF= 4, MT= 58 | RECORD NUMBER | 1266 |
| SECTION 4/ 58 NOT IN DIRECTORY | | |
40. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 4, MT= 59 (0): Directory (b)
- | | | |
|---|---------------|------|
| ERROR(S) FOUND IN MAT=5631, MF= 4, MT= 59 | RECORD NUMBER | 1291 |
| SECTION 4/ 59 NOT IN DIRECTORY | | |
41. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 4, MT= 60 (0): Directory (b)
- | | | |
|---|---------------|------|
| ERROR(S) FOUND IN MAT=5631, MF= 4, MT= 60 | RECORD NUMBER | 1315 |
| SECTION 4/ 60 NOT IN DIRECTORY | | |
42. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 4, MT= 91 (0): Directory (b)
- | | | |
|---|---------------|------|
| ERROR(S) FOUND IN MAT=5631, MF= 4, MT= 91 | RECORD NUMBER | 1392 |
| SECTION 4/ 91 NOT IN DIRECTORY | | |
43. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 5, MT= 16 (0): Directory (b)
- | | | |
|---|---------------|------|
| ERROR(S) FOUND IN MAT=5631, MF= 5, MT= 16 | RECORD NUMBER | 1417 |
| SECTION 5/ 16 NOT IN DIRECTORY | | |
44. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 5, MT= 17 (0): Directory (b)
- | | | |
|---|---------------|------|
| ERROR(S) FOUND IN MAT=5631, MF= 5, MT= 17 | RECORD NUMBER | 1475 |
| SECTION 5/ 17 NOT IN DIRECTORY | | |
45. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 5, MT= 22 (0): Directory (b)
- | | | |
|---|---------------|------|
| ERROR(S) FOUND IN MAT=5631, MF= 5, MT= 22 | RECORD NUMBER | 1497 |
| SECTION 5/ 22 NOT IN DIRECTORY | | |
46. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 5, MT= 28 (0): Directory (b)
- | | | |
|---|---------------|------|
| ERROR(S) FOUND IN MAT=5631, MF= 5, MT= 28 | RECORD NUMBER | 1726 |
| SECTION 5/ 28 NOT IN DIRECTORY | | |
47. Missing a section in directory so your directory is messed up. This error will break everything else
MAT=5631, MF= 5, MT= 91 (0): Directory (b)

• psyche Warnings:

1. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ISOTOPE MASS = 132. L = 0 / STRENGTH FUNCTION IS 2.28299E-04 / STRENGTH FUNCTION 2.28299E-04 / LIES OUTSIDE LIMITS 1.00000E-05 TO 1.00000E-04 (0): URR str. ftn.

```
FILE 2
SECTION 151
ISOTOPE MASS = 132. L = 0
STRENGTH FUNCTION IS 2.28299E-04
STRENGTH FUNCTION 2.28299E-04
... [1 more lines]
```

2. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.76480E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

```
FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.76480E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
```

3. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.78308E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

```
FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.78308E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
```

4. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.80003E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

```
FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.80003E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
... [1 more lines]
```

5. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.80006E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.80006E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
... [1 more lines]

6. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.79985E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.79985E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
... [1 more lines]

7. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.80007E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.80007E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04

8. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.79999E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.79999E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04

9. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.80001E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.80001E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04

10. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.79998E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.79998E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
... [2 more lines]
11. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.80008E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.
- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.80008E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
... [1 more lines]
12. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.79997E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.
- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.79997E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
13. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.80011E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.
- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.80011E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
14. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.80002E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.
- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.80002E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
15. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.80000E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.80000E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
16. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.79983E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.
- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.79983E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
17. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.79987E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.
- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.79987E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
18. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.80014E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.
- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.80014E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
19. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.80010E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.
- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.80010E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
20. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.79993E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.79993E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
21. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05 / STRENGTH FUNCTION 8.79996E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.
- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.76480E-05
STRENGTH FUNCTION 8.79996E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
22. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.79298E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.
- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.79298E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
23. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.80020E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.
- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.80020E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
... [2 more lines]
24. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.80021E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.
- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.80021E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
... [2 more lines]
25. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.80003E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.80003E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
... [1 more lines]

26. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.80023E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.80023E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04

27. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.79989E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.79989E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04

28. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.79985E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.79985E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04

29. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.79998E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.79998E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04

30. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.80008E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.80008E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
... [1 more lines]

31. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.80015E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.80015E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04

32. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.80000E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.80000E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04

33. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.79994E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.79994E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04

34. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.80002E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.80002E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04

35. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.79982E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.79982E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
36. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.80024E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.
- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.80024E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
37. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.79978E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.
- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.79978E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
38. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.80014E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.
- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.80014E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
39. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.79990E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.
- FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.79990E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04
40. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.80013E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

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FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.80013E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04

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41. Strength function in URR not in agreement with PSYCHE's expectations
FILE 2 / SECTION 151 / ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05 / STRENGTH FUNCTION 8.79974E-05 / LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04 (0): URR str. ftn.

```

FILE 2
SECTION 151
ENERGY = 1.30000E+02. STRENGTH FUNCTION IS 8.79298E-05
STRENGTH FUNCTION 8.79974E-05
LIES OUTSIDE LIMITS 1.00000E-04 TO 8.00000E-04

```

• fudge-4.0 Warnings:

1. Missing a channel with a particular angular momenta combination
resonances / resolved / MultiLevelBreitWigner (Error # 0): missingResonanceChannel

WARNING: Missing a channel with angular momenta combination L = 0, J = 1.5 and S = 1.5 for "capture"

2. Potential scattering hasn't converted, you need more L's!
resonances / resolved (Error # 1): potentialScatteringNotConverged

WARNING: Potential scattering hasn't converged by L=0 at E=130.0 eV, xs[0]/xs[0]=100.0% > 0.1%

3. Cross section does not match sum of linked reaction cross sections
crossSectionSum label 0: total (Error # 0): CS Sum.

WARNING: Cross section does not match sum of linked reaction cross sections! Max diff: 0.65%

4. Cross section does not match sum of linked reaction cross sections
crossSectionSum label 1: (z,n) (Error # 0): CS Sum.

WARNING: Cross section does not match sum of linked reaction cross sections! Max diff: 0.15%

• fudge-4.0 Errors:

1. Calculated and tabulated Q values disagree.
reaction label 12: n[multiplicity:'2'] + Ba131 (Error # 0): Q mismatch

WARNING: Calculated and tabulated Q-values disagree: -9759889.642700195 eV vs -9.8031e6 eV!

2. Calculated and tabulated Q values disagree.
reaction label 13: n[multiplicity:'3'] + Ba130 (Error # 0): Q mismatch

WARNING: Calculated and tabulated Q-values disagree: -17253394.7943573 eV vs -1.73022e7 eV!

3. Calculated and tabulated Q values disagree.
reaction label 14: n + H1 + Cs131 (Error # 0): Q mismatch

WARNING: Calculated and tabulated Q-values disagree: -7601547.449676514 eV vs -7680640. eV!

4. Calculated and tabulated Q values disagree.
reaction label 15: Ba133 + gamma (Error # 0): Q mismatch

WARNING: Calculated and tabulated Q-values disagree: 7252414.140319824 eV vs 7187390. eV!

5. Calculated and tabulated Q values disagree.
reaction label 16: n + He4 + Xe128 (Error # 0): Q mismatch

WARNING: Calculated and tabulated Q-values disagree: -937239.5010986328 eV vs -1.0137e6 eV!

6. Calculated and tabulated Q values disagree.
reaction label 17: H1 + Cs132_s (Error # 0): Q mismatch

WARNING: Calculated and tabulated Q-values disagree: -434090.3648071289 eV vs -495538. eV!

7. Calculated and tabulated Q values disagree.
reaction label 19: H3 + Cs130_s (Error # 0): Q mismatch

WARNING: Calculated and tabulated Q-values disagree: -8350427.547302246 eV vs -8464460. eV!

8. Calculated and tabulated Q values disagree.
reaction label 20: He3 + Xe130_s (Error # 0): Q mismatch

WARNING: Calculated and tabulated Q-values disagree: -5350547.68081665 eV vs -5427730. eV!

9. Calculated and tabulated Q values disagree.
reaction label 21: He4 + Xe129_s (Error # 0): Q mismatch

WARNING: Calculated and tabulated Q-values disagree: 5971424.31867981 eV vs 5.8987e6 eV!

• njoy2012 Warnings:

1. With the advent of the ENDF-6 format, it is possible to make evaluations that fully describe all the products of a nuclear reaction. Some carry-over evaluations from earlier ENDF/B versions also have this capability, but many do not. This message is intended to goad evaluators to improve things!
group...compute self-shielded group-averaged cross-sections (0): GROUPR/conver (0)

---message from conver---cannot do complete particle production for mt= 16
only mf4/mf5 provided

2. With the advent of the ENDF-6 format, it is possible to make evaluations that fully describe all the products of a nuclear reaction. Some carry-over evaluations from earlier ENDF/B versions also have this capability, but many do not. This message is intended to goad evaluators to improve things!
group...compute self-shielded group-averaged cross-sections (1): GROUPR/conver (0)

---message from conver---cannot do complete particle production for mt= 17
only mf4/mf5 provided

3. With the advent of the ENDF-6 format, it is possible to make evaluations that fully describe all the products of a nuclear reaction. Some carry-over evaluations from earlier ENDF/B versions also have this capability, but many do not. This message is intended to goad evaluators to improve things!
group...compute self-shielded group-averaged cross-sections (2): GROUPR/conver (0)

---message from conver---cannot do complete particle production for mt= 22
only mf4/mf5 provided

4. With the advent of the ENDF-6 format, it is possible to make evaluations that fully describe all the products of a nuclear reaction. Some carry-over evaluations from earlier ENDF/B versions also have this capability, but many do not. This message is intended to goad evaluators to improve things!
grouppr...compute self-shielded group-averaged cross-sections (3): GROUPR/conver (0)

---message from conver---cannot do complete particle production for mt= 28
only mf4/mf5 provided

5. With the advent of the ENDF-6 format, it is possible to make evaluations that fully describe all the products of a nuclear reaction. Some carry-over evaluations from earlier ENDF/B versions also have this capability, but many do not. This message is intended to goad evaluators to improve things!
grouppr...compute self-shielded group-averaged cross-sections (4): GROUPR/conver (0)

---message from conver---cannot do complete particle production for mt= 91
only mf4/mf5 provided